



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/772,407	02/06/2004	Simon Paul Davis	037256.53206US	2072
23911	7590	11/15/2007	EXAMINER	
CROWELL & MORING LLP INTELLECTUAL PROPERTY GROUP P.O. BOX 14300 WASHINGTON, DC 20044-4300			YUN, EUGENE	
		ART UNIT	PAPER NUMBER	
				2618
		MAIL DATE	DELIVERY MODE	
		11/15/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/772,407	DAVIS, SIMON PAUL	
	Examiner	Art Unit	
	Eugene Yun	2618	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 20 August 2007.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-12 is/are pending in the application.
 - 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-12 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 06 February 2004 is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) Notice of References Cited (PTO-892)
- 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) Information Disclosure Statement(s) (PTO/SB/08)
 Paper No(s)/Mail Date _____.
- 4) Interview Summary (PTO-413)
 Paper No(s)/Mail Date. _____.
- 5) Notice of Informal Patent Application
- 6) Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1, 4, and 5 are rejected under 35 U.S.C. 103(a) as being unpatentable over Averbuch et al. (US 6,192,029) in view of Harrell et al. (US 7,274,661).

Referring to Claim 1, Averbuch teaches a method of operating a base station system comprising at least one base station controller (BSC) 208 (fig. 2); the method comprising controlling receipt of data from a streaming source; storing the data from the streaming source in a BSC buffer of a BSC in a first cell (see col. 3, lines 57-63) when a mobile station (MS) 202 (fig. 2) is communicating via the first cell; and transmitting the data to an MS buffer of the MS from the BSC buffer in the first cell at a first data rate via the first cell (see col. 8, lines 31-37).

Averbuch does not teach the BSC in the first cell monitoring the MS and on receipt of an indication that the MS has ceased communication via the first cell, the BSC in the first cell preventing further streaming data from entering the BSC buffer in the first cell; the BSC in the first cell monitoring for an indication that the MS has set up communication via a second cell; and on receipt of such an indication, instructs the streaming source to continue data transfer via the second cell; and a BSC in the second cell instructing the streaming source to increase the rate of data transfer to the MS

buffer via the second cell until the MS buffer is substantially refilled; and thereafter to continue data transfer at the first data rate.

Harrell teaches the BSC in the first cell monitoring the MS and on receipt of an indication that the MS has ceased communication via the first cell, the BSC in the first cell preventing further streaming data from entering the BSC buffer in the first cell (see col. 6, lines 61-67); the BSC in the first cell monitoring for an indication that the MS has set up communication via a second cell; and on receipt of such an indication, instructs the streaming source to continue data transfer via the second cell (see col. 7, lines 27-38); and a BSC in the second cell instructing the streaming source to increase the rate of data transfer to the MS buffer via the second cell until the MS buffer is substantially refilled; and thereafter to continue data transfer at the first data rate (see col. 7, lines 38-50). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the teachings of Harrell to said device of Averbuch in order to better prevent the loss of received packets in between cells.

Referring to Claim 4, Harrell also teaches the increased data rate set between an original guaranteed bit rate and a peak rate (see col. 7, lines 40-50).

Referring to Claim 5, Harrell also teaches the rate of data transfer increased by changing the guaranteed bit rate (see col. 7, lines 40-50).

3. Claims 2, 3, and 6-12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Averbuch and Harrell and further in view of Grech (GB 2364858).

Referring to Claim 7, Averbuch teaches A handover method in a general packet radio service (GPRS) system, the method comprising receiving data from a streaming source in a node, transmitting said data to a mobile station (MS) at a first data rate via a first cell (see col. 8, lines 31-37); storing the data in an MS buffer in the MS; and running an application on the MS using data from the MS buffer (see col. 3, lines 57-63).

Averbuch does not teach that on receipt of an indication that the MS has ceased communication via the first cell; instructing the SGSN to store data in an SGSN buffer; monitoring for an indication that the MS has set up communication via a second cell; and continuing data transfer via the second cell; increasing the rate of data transfer from the SGSN to the MS buffer via the second cell until the MS buffer is substantially refilled; and thereafter continuing data transfer at the first data rate.

Harrell teaches that on receipt of an indication that the MS has ceased communication via the first cell; instructing the SGSN to store data in an SGSN buffer (see col. 6, lines 61-67); monitoring for an indication that the MS has set up communication via a second cell; and continuing data transfer via the second cell (see col. 7, lines 27-38); increasing the rate of data transfer from the SGSN to the MS buffer via the second cell until the MS buffer is substantially refilled; and thereafter continuing data transfer at the first data rate (see col. 7, lines 38-50). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the teachings of Harrell to said device of Averbuch in order to better prevent the loss of received packets in between cells.

The combination of Averbuch and Harrell does not teach the node as a serving GPRS support node. Grech teaches the node as a serving GPRS support node (SGSN) (see pg. 2, lines 10-19). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the teachings of Grech to the modified device of Averbuch and Harrell in order to better enhance handoff service for mobile users.

Referring to Claim 2, the combination of Averbuch and Harrell does not teach the streaming data stored in a store in a service GPRS support node (SGSN) before being transmitted to the BSC buffer. Grech teaches the streaming data stored in a store in a service GPRS support node (SGSN) before being transmitted to the BSC buffer (see pg. 2, lines 10-19). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to provide the teachings of Grech to the modified device of Averbuch and Harrell in order to better enhance handoff service for mobile users.

Referring to Claims 3 and 8, Grech also teaches the SGSN measuring a service interruption time and determines the required increased rate of data transfer and the period for which that data transfer rate shall be maintained therefrom (see pg. 3, lines 11-18).

Referring to Claims 6 and 12, Grech also teaches the streaming source as one of a real-audio streaming from the Internet, or video (see pg. 2, lines 29-30).

Referring to Claim 9, Averbuch also teaches the increased data rate set between an original guaranteed bit rate and a peak rate (see col. 3, lines 47-56).

Referring to Claim 10, Harrell also teaches the rate of data transfer increased by changing the guaranteed bit rate (see col. 7, lines 40-50).

Referring to Claim 11, Grech also teaches data transfer from the SGSN to the MS controlled by a base station controller (see pg. 2, lines 10-19).

Response to Arguments

4. Applicant's arguments with respect to claims 1-12 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Eugene Yun whose telephone number is (571) 272-7860. The examiner can normally be reached on 9:00am-6:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Matthew D. Anderson can be reached on (571)272-4177. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

EY
Eugene Yun
Examiner
Art Unit 2618

EY